

WE CLAIM:

1. A method for performing a cash card operation at a point of sale (POS) terminal, the cash card associated with a predetermined amount of money and comprising a first card identification number, the method comprising:

5 receiving a second card identification number of the cash card from the POS terminal, the second card identification number able to be mapped or translated into the first card identification number;

determining an operation based on the second card identification number; and executing the operation by accessing an account associated with the cash card.

10

2. A method for performing a cash card operation at a point of sale (POS) terminal, the cash card associated with a predetermined amount of money and usable in purchases over a first network with a first card identification number, the method comprising:

15

receiving a second card identification number of the cash card from the POS terminal through a second network, the second card identification having a format consistent with the second network that can be mapped or translated into the first card identification;

20

determining an operation to be made on the cash card based on the second card identification number; and

executing the operation by accessing an account associated with the cash card, the account accessible over the first network.

3. The method of claim 1, further comprising:

25

receiving the first card identification number of the cash card through a first network for purchasing an item; and

subtracting the cost of the item from the account associated with the cash card.

LAW OFFICES

FINNEGAN, HENDERSON,
FARABOW, GARRETT
& DUNNER, L.L.P.
STANFORD RESEARCH PARK
700 HANSEN WAY
PALO ALTO, CALIF. 94304
650-849-6600

4. The method of claim 1, wherein the operation is determined based on information received as a Personal Identification Number (PIN) along with the second card identification number.
- 5
5. The method of claim 1, wherein the operation is determined based on a denomination of an amount of money received with the second card identification number.
- 10
6. The method of claim 1, wherein when the operation is determined to be activation, the account is activated by executing the operation.
- 15
7. The method of claim 1, wherein when the operation is determined to be deactivation, the account is deactivated by executing the operation.
8. The method of claim 1, wherein when the operation is determined as reloading, an amount of the reloading paid by a customer at the POS terminal is added to the account by executing the operation.
- 20
9. The method of claim 7, further comprising:
preventing the account from exceeding the predetermined amount of money.
10. The method of claim 8, further comprising:
preventing more than a predetermined number of attempts of reloading to the account, whether the reloading is successfully executed or not.
- 25
11. The method of claim 1, wherein when the operation is determined to be payment, an amount of a payment is subtracted from the account.

- PENDING - 02003270
12. The method of claim 10, wherein the amount of the payment includes a cost of an item purchased by a customer at the POS terminal and an additional amount of cash paid to the customer at the POS terminal.
- 5
13. The method of claim 1, wherein a user PIN entered by a customer is received along with the second card identification number, and further comprising verifying that the user PIN is correct for the account identified by the second card identification number before executing the operation.
- 10
14. The method of claim 12, wherein the user PIN is received through a second network and has a format consistent with the second network and is obtained by translating another user PIN of the cash card for the purchase over a first network.
- 15
15. A method for enabling a customer to withdraw money using a cash card at an automated teller machine (ATM), the cash card associated with a predetermined amount of money and usable in purchase over a first network with a first card identification number, the method comprising:
- 20 receiving a second card identification number of the cash card along with a User PIN from the ATM through a second network, the second card identification number having a format consistent with the second network and translatable into the first card identification number;
- 25 verifying that the User PIN is correct for an account identified by the second card identification number, the account accessible over the first network; and subtracting an amount of money to be withdrawn from the account.
16. A method for converting currency for a cash card usable in payment over a first

network, the cash card associated with a predetermined amount of money in an account, the method comprising:

receiving a card identification number of the cash card through the first network for the payment;

5 determining that a first currency in the payment and a second currency in the account identified by the card identification number are different;

converting a current amount of the account in the second currency into the first currency;

subtracting the payment from the current amount in the first currency; and

10 converting a remaining amount after subtracting of the account in the first currency into the second currency if the remaining amount exists.

17. A method for converting currency for a cash card usable in payment over a first network, the cash card associated with a predetermined amount of money in an account, the method comprising:

receiving a card identification number of the cash card through the first network for conversion into a first currency;

determining that a customer of the cash card accepts a conversion rate from a second currency in the account identified by the card identification number into the first currency; and

20 converting an amount of the account in the second currency into the first currency.

18. A method for enabling a customer to make a payment using a cash card at a point of sale (POS) location, the cash card associated with a predetermined amount of money and usable in purchase over a first network, the method comprising:

receiving, at the POS location, a card identification number of the cash card along with a User PIN from the customer, and transaction information from a store clerk;

creating payment-specific authentication information from the card identification number, the User PIN, and the transaction information;

transmitting, through the first network to a server managing an account associated with the cash card, the payment-specific authentication information, such that

5 the server verifies the payment-specific authentication information and makes the payment from the account of the customer.

19. A method for performing pre-authorization of a payment from a customer to a merchant with a cash card, the cash card associated with a predetermined amount of

10 money and usable in purchase over a first network, the method comprising:

receiving, at a server managing a first account associated with the cash card of the customer, a pre-authorization request message including payment-specific authentication information created at a time of the payment;

15 subtracting an amount of the payment from the first account according to the pre-authorization request;

adding at least a part of the amount subtracted from the first account to a second account of the merchant when a pre-authorization release message including the payment-specific authentication information is received at the server; and

20 adding at least a part of the amount subtracted from the first account to the first account when a pre-authorization cancellation message including the payment-specific authentication information is received at the server.

25 20. The method of claim 19, wherein the payment-specific authentication information included in the pre-authorization release message or the pre-authorization cancellation message is signed by the merchant.

21. A method for performing refund of a payment from a customer to a merchant with a cash card, the cash card associated with a predetermined amount of money and

usable in purchase over a first network, the method comprising:

creating payment-specific authentication information at a time of the payment;

transferring an amount of the payment from a first account associated with the cash card of the customer to a second account of the merchant according to the

5 payment-specific authentication information;

receiving a refund message including the payment-specific authentication information with a signature of the merchant; and

returning at least a part of the amount transferred from the second account to the first account according to the refund request when the signature is verified.

10

22. A method for escrowing transaction between a seller and a buyer with a cash card, the cash card associated with a predetermined amount of money and usable in purchase over a first network, the method comprising:

15

creating payment-specific authentication information when the buyer purchases an item from the seller;

subtracting a cost of the item from a first account associated with the cash card of the buyer according to the payment-specific authentication information;

transmitting the payment-specific authentication information such that the seller receives the payment-specific authentication information after the buyer receives the item; and

adding at least a part of the cost subtracted from the first account to a second account of the seller when the payment-specific authentication information from the seller.

25

23. The method of claim 22, further comprising:

creating payment-specific verification information when the buyer purchases the item from the seller; and

transmitting the payment-specific verification information such that the seller

sends the item after the seller receives the payment-specific verification information.

24. The method of claim 22, further comprising:

5 adding at least a part of the cost subtracted from the first account to the first account when the payment-specific authentication information is not received from the seller or a proper refund request is received from the buyer.

25. The method of claim 22, wherein at least one of identities of the buyer and the seller is not required in escrowing.

10

RECEIVED
U.S. PATENT AND TRADEMARK OFFICE
JULY 10 1997

LAW OFFICES
FINNEGAN, HENDERSON,
FARABOW, GARRETT
& DUNNER, L.L.P.
STANFORD RESEARCH PARK
700 HANSEN WAY
PALO ALTO, CALIF. 94304
650-849-6600